ABSTRACT OF THE DISCLOSURE

A brushless generator is composed of a front bracket, a rear bracket, a stator, a rotary shaft, a core, poles, a ring, a field core, a field winding bobbin, and a field winding. Air gaps are defined by facing surfaces between the field core and the core, between the poles and the stator, between one side of a pole and the field core, and between the core and another side pole. Magnetic coating made of magnetic particles and a binding material is applied to the surfaces which face the air gaps. A tensile strength of the magnetic coating is set smaller than a bonding strength of the same. Thus, in case that the surfaces to which the magnetic coating is applied is damaged by an external force, the magnetic coating does not peel but rather the breaking of the base material occurs.